

**UPOV**

**TG/COSMO(proj.2)**

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**INTERNATIONAL UNION FOR THE PROTECTION OF NEW VARIETIES OF PLANTS**

GENEVA

**DRAFT**

**COSMOS**

UPOV Code: COSMO

*Cosmos Cav.*

**GUIDELINES**

**FOR THE CONDUCT OF TESTS**

**FOR DISTINCTNESS, UNIFORMITY AND STABILITY**

*prepared by an expert from Japan*

*to be considered by the*

*Technical Working Party for Ornamental Plants and Forest Trees  
at its forty-third session, to be held in Cuernavaca, Morelos State, Mexico,  
from September 20 to 24, 2010*

Alternative Names:\*

<i>Botanical name</i>	<i>English</i>	<i>French</i>	<i>German</i>	<i>Spanish</i>
<i>Cosmos Cav.</i>	Cosmos	Cosmos	Kosmee; Schmuckkörbchen	Cosmos

The purpose of these guidelines ("Test Guidelines") is to elaborate the principles contained in the General Introduction (document TG/1/3), and its associated TGP documents, into detailed practical guidance for the harmonized examination of distinctness, uniformity and stability (DUS) and, in particular, to identify appropriate characteristics for the examination of DUS and production of harmonized variety descriptions.

**ASSOCIATED DOCUMENTS**

These Test Guidelines should be read in conjunction with the General Introduction and its associated TGP documents.

\* These names were correct at the time of the introduction of these Test Guidelines but may be revised or updated. [Readers are advised to consult the UPOV Code, which can be found on the UPOV Website ([www.upov.int](http://www.upov.int)), for the latest information.]

<u>TABLE OF CONTENTS</u>	<u>PAGE</u>
1. SUBJECT OF THESE TEST GUIDELINES.....	3
2. MATERIAL REQUIRED .....	3
3. METHOD OF EXAMINATION.....	3
3.1 Number of Growing Cycles .....	3
3.2 Testing Place .....	3
3.3 Conditions for Conducting the Examination.....	3
3.4 Test Design .....	4
3.5 Additional Tests .....	4
4. ASSESSMENT OF DISTINCTNESS, UNIFORMITY AND STABILITY .....	4
4.1 Distinctness .....	4
4.2 Uniformity.....	6
4.3 Stability .....	6
5. GROUPING OF VARIETIES AND ORGANIZATION OF THE GROWING TRIAL.....	6
6. INTRODUCTION TO THE TABLE OF CHARACTERISTICS .....	7
6.1 Categories of Characteristics.....	7
6.2 States of Expression and Corresponding Notes.....	7
6.3 Types of Expression.....	8
6.4 Example Varieties .....	8
6.5 Legend.....	8
7. TABLE OF CHARACTERISTICS/TABLEAU DES CARACTERES/MERKMALSTABELLE/TABLA DE CARACTERES.....	9
8. EXPLANATIONS ON THE TABLE OF CHARACTERISTICS .....	15
8.1 Explanations covering several characteristics .....	15
8.2 Explanations for individual characteristics .....	15
9. LITERATURE .....	21
10. TECHNICAL QUESTIONNAIRE.....	22

## 1. Subject of these Test Guidelines

These Test Guidelines apply to all varieties of *Cosmos* Cav. of the family *Asteraceae* (*Compositae*).

## 2. Material Required

2.1 The competent authorities decide on the quantity and quality of the plant material required for testing the variety and when and where it is to be delivered. Applicants submitting material from a State other than that in which the testing takes place must ensure that all customs formalities and phytosanitary requirements are complied with.

2.2 The material is to be supplied in the form of seeds or young plants.

2.3 The minimum quantity of plant material, to be supplied by the applicant, should be:

seed propagated varieties:	sufficient seeds to produce 50 plants;
vegetatively propagated varieties:	20 young plants

In the case of seed, the seed should meet the minimum requirements for germination, species and analytical purity, health and moisture content, specified by the competent authority. In cases where the seed is to be stored, the germination capacity should be as high as possible and should be stated by the applicant.

2.4 The plant material supplied should be visibly healthy, not lacking in vigor, nor affected by any important pest or disease.

2.5 The plant material should not have undergone any treatment which would affect the expression of the characteristics of the variety, unless the competent authorities allow or request such treatment. If it has been treated, full details of the treatment must be given.

## 3. Method of Examination

### 3.1 *Number of Growing Cycles*

The minimum duration of tests should normally be a single growing cycle.

### 3.2 *Testing Place*

Tests are normally conducted at one place. In the case of tests conducted at more than one place, guidance is provided in TGP/9 "Examining Distinctness".

### 3.3 *Conditions for Conducting the Examination*

3.3.1 The tests should be carried out under conditions ensuring satisfactory growth for the expression of the relevant characteristics of the variety and for the conduct of the examination.

### 3.3.2 Stage of development for the assessment

The optimum stage of development for the assessment of each characteristic is indicated by a number in the second column of the Table of Characteristics. The stages of development denoted by each number are described in Chapter 8.

### 3.3.3 Observation of color by eye

Because daylight varies, color determinations made against a color chart should be made either in a suitable cabinet providing artificial daylight or in the middle of the day in a room without direct sunlight. The spectral distribution of the illuminant for artificial daylight should conform with the CIE Standard of Preferred Daylight D 6500 and should fall within the tolerances set out in the British Standard 950, Part I. These determinations should be made with the plant part placed against a white background. The color chart and version used should be specified in the variety description.

## 3.4 *Test Design*

3.4.1 Each test should be designed to result in a total of at least 50 plants for seed propagated varieties or 10 plants for vegetatively propagated varieties.

3.4.2 The design of the tests should be such that plants or parts of plants may be removed for measurement or counting without prejudice to the observations which must be made up to the end of the growing cycle.

## 3.5 *Additional Tests*

Additional tests, for examining relevant characteristics, may be established.

## 4. Assessment of Distinctness, Uniformity and Stability

### 4.1 *Distinctness*

#### 4.1.1 General Recommendations

It is of particular importance for users of these Test Guidelines to consult the General Introduction prior to making decisions regarding distinctness. However, the following points are provided for elaboration or emphasis in these Test Guidelines.

#### 4.1.2 Consistent Differences

The differences observed between varieties may be so clear that more than one growing cycle is not necessary. In addition, in some circumstances, the influence of the environment is not such that more than a single growing cycle is required to provide assurance that the differences observed between varieties are sufficiently consistent. One means of ensuring that a difference in a characteristic, observed in a growing trial, is sufficiently consistent is to examine the characteristic in at least two independent growing cycles.

#### 4.1.3 Clear Differences

Determining whether a difference between two varieties is clear depends on many factors, and should consider, in particular, the type of expression of the characteristic being examined, i.e. whether it is expressed in a qualitative, quantitative, or pseudo-qualitative manner. Therefore, it is important that users of these Test Guidelines are familiar with the recommendations contained in the General Introduction prior to making decisions regarding distinctness.

#### 4.1.4 Number of Plants / Parts of Plants to be Examined

4.1.4.1 Unless otherwise indicated, for seed-propagated varieties, all observations for the purposes of distinctness should be made on 20 plants or parts taken from each of 20 plants, disregarding any off-type plants.

4.1.4.2 Unless otherwise indicated, for vegetatively propagated varieties, all observations for the purposes of distinctness should be made on 10 plants or parts taken from each of 10 plants, disregarding any off-type plants.

#### 4.1.5 Method of Observation

The recommended method of observing the characteristic for the purposes of distinctness is indicated by the following key in the second column of the Table of Characteristics (see document TGP/9 “Examining Distinctness”, Section 4 “Observation of characteristics”):

MG: single measurement of a group of plants or parts of plants

MS: measurement of a number of individual plants or parts of plants

VG: visual assessment by a single observation of a group of plants or parts of plants

VS: visual assessment by observation of individual plants or parts of plants

Type of observation: visual (V) or measurement (M)

“Visual” observation (V) is an observation made on the basis of the expert’s judgment. For the purposes of this document, “visual” observation refers to the sensory observations of the experts and, therefore, also includes smell, taste and touch. Visual observation includes observations where the expert uses reference points (e.g. diagrams, example varieties, side-by-side comparison) or non-linear charts (e.g. color charts). Measurement (M) is an objective observation against a calibrated, linear scale e.g. using a ruler, weighing scales, colorimeter, dates, counts, etc.

Type of record: for a group of plants (G) or for single, individual plants (S)

For the purposes of distinctness, observations may be recorded as a single record for a group of plants or parts of plants (G), or may be recorded as records for a number of single, individual plants or parts of plants (S). In most cases, “G” provides a single record per variety and it is not possible or necessary to apply statistical methods in a plant-by-plant analysis for the assessment of distinctness.

In cases where more than one method of observing the characteristic is indicated in the Table of Characteristics (e.g. VG/MG), guidance on selecting an appropriate method is provided in document TGP/9, Section 4.2.

#### 4.2 *Uniformity*

4.2.1 It is of particular importance for users of these Test Guidelines to consult the General Introduction prior to making decisions regarding uniformity. However, the following points are provided for elaboration or emphasis in these Test Guidelines:

4.2.2 For the assessment of uniformity of seed-propagated varieties, a population standard of 3 % and an acceptance probability of at least 95 % should be applied. In the case of a sample size of 50 plants, 3 off-types are allowed.

4.2.3 For the assessment of uniformity of vegetatively propagated varieties, a population standard of 1% and an acceptance probability of at least 95% should be applied. In the case of a sample size of 10 plants, 1 off-type is allowed.

#### 4.3 *Stability*

4.3.1 In practice, it is not usual to perform tests of stability that produce results as certain as those of the testing of distinctness and uniformity. However, experience has demonstrated that, for many types of variety, when a variety has been shown to be uniform, it can also be considered to be stable.

4.3.2 Where appropriate, or in cases of doubt, stability may be further examined by testing a new seed or plant stock to ensure that it exhibits the same characteristics as those shown by the initial material supplied.

### 5. Grouping of Varieties and Organization of the Growing Trial

5.1 The selection of varieties of common knowledge to be grown in the trial with the candidate varieties and the way in which these varieties are divided into groups to facilitate the assessment of distinctness are aided by the use of grouping characteristics.

5.2 Grouping characteristics are those in which the documented states of expression, even where produced at different locations, can be used, either individually or in combination with other such characteristics: (a) to select varieties of common knowledge that can be excluded from the growing trial used for examination of distinctness; and (b) to organize the growing trial so that similar varieties are grouped together.

5.3 The following have been agreed as useful grouping characteristics:

- (a) Leaf: type (characteristic 5)
- (b) Flower head: type (characteristic 11)
- (c) Flower head: disc type (characteristic 12)
- (d) Flower head: collarete segments (characteristic 13)
- (e) Ray floret: type (characteristic 17)
- (f) Ray floret: main color of inner side (characteristic 22) with the following color groups:
  - Gr. 1: white
  - Gr. 2: yellow
  - Gr. 3: orange

- Gr. 4: pink
- Gr. 5: red
- Gr. 6: purple red
- Gr. 7: brown red

5.4 Guidance for the use of grouping characteristics, in the process of examining distinctness, is provided through the General Introduction and document TGP/9 “Examining Distinctness”.

## 6. Introduction to the Table of Characteristics

### 6.1 *Categories of Characteristics*

#### 6.1.1 Standard Test Guidelines Characteristics

Standard Test Guidelines characteristics are those which are approved by UPOV for examination of DUS and from which members of the Union can select those suitable for their particular circumstances.

#### 6.1.2 Asterisked Characteristics

Asterisked characteristics (denoted by \*) are those included in the Test Guidelines which are important for the international harmonization of variety descriptions and should always be examined for DUS and included in the variety description by all members of the Union, except when the state of expression of a preceding characteristic or regional environmental conditions render this inappropriate.

### 6.2 *States of Expression and Corresponding Notes*

6.2.1 States of expression are given for each characteristic to define the characteristic and to harmonize descriptions. Each state of expression is allocated a corresponding numerical note for ease of recording of data and for the production and exchange of the description.

6.2.2 In the case of qualitative and pseudo-qualitative characteristics (see Chapter 6.3), all relevant states of expression are presented in the characteristic. However, in the case of quantitative characteristics with 5 or more states, an abbreviated scale may be used to minimize the size of the Table of Characteristics. For example, in the case of a quantitative characteristic with 9 states, the presentation of states of expression in the Test Guidelines may be abbreviated as follows:

State	Note
small	3
medium	5
large	7

However, it should be noted that all of the following 9 states of expression exist to describe varieties and should be used as appropriate:

State	Note
very small	1
very small to small	2
small	3
small to medium	4
medium	5
medium to large	6
large	7
large to very large	8
very large	9

6.2.3 Further explanation of the presentation of states of expression and notes is provided in document TGP/7 “Development of Test Guidelines”.

### 6.3 *Types of Expression*

An explanation of the types of expression of characteristics (qualitative, quantitative and pseudo-qualitative) is provided in the General Introduction.

### 6.4 *Example Varieties*

Where appropriate, example varieties are provided to clarify the states of expression of each characteristic.

### 6.5 *Legend*

(\*) Asterisked characteristic – see Chapter 6.1.2

QL Qualitative characteristic – see Chapter 6.3

QN Quantitative characteristic – see Chapter 6.3

PQ Pseudo-qualitative characteristic – see Chapter 6.3

MG, MS, VG, VS – see Chapter 4.1.5

(a)-(e) See Explanations on the Table of Characteristics in Chapter 8.1

(+) See Explanations on the Table of Characteristics in Chapter 8.2.



7. Table of Characteristics/Tableau des caractères/Merkmalstabelle/Tabla de caracteres

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>1. MS</b>	<b>Plant: height</b>					
(*)						
<b>QN</b>	short					3
	medium				Sensation Radiance	5
	tall					7
<b>2. VG/ MS</b>	<b>Stem: number of primary branches</b>					
<b>QN</b>	few					3
	medium				Sensation Radiance	5
	many					7
<b>3. VG</b>	<b>Stem: color</b>					
(*)						
(a)						
<b>PQ</b>	light green					1
	medium green					2
	green tinged with brown				Sensation Radiance	3
	reddish					4
	purple					5
	brown					6
<b>4. VG</b>	<b>Stem: pubescence</b>					
(a)						
<b>QN</b>	absent or sparse				Sunrise	1
	medium				Bright Light	2
	dense				Sunset	3

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota	
<b>5.</b>	<b>VG</b>	<b>Leaf: type</b>					
(*)							
(+)	(b)						
<b>QL</b>		lineared lobe				1	
		broad lobe				2	
<b>6.</b>	<b>VG</b>	<b>Leaf: number of lobes</b>					
(+)							
<b>QN</b>	(b)	few				1	
		medium				2	
		many				3	
<b>7.</b>	<b>MS</b>	<b>Leaf: length including petiole</b>					
(*)							
(+)							
<b>QN</b>	(b)	short				3	
		medium			Sensation Radiance	5	
		long				7	
<b>8.</b>	<b>MS</b>	<b>Leaf: width</b>					
(*)							
(+)							
<b>QN</b>		narrow				3	
		medium			Sensation Radiance	5	
		broad				7	
<b>9.</b>	<b>VG</b>	<b>Leaf: intensity of green color</b>					
<b>QN</b>	(b)	light				3	
		medium			Sensation Radiance, Sunset	5	
		dark				7	

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>10.</b>	<b>VG/MS</b>	<b>Leaf: width of terminal leaflet</b>				
(+)	(b)					
<b>QN</b>	narrow					3
	medium				Sunset	5
	broad					7
<b>11.</b>	<b>VG</b>	<b>Flower head: type</b>				
(*)						
(+)						
<b>PQ</b>	single				Sensation Radiance	1
	semi double					2
	double					3
<b>12.</b>	<b>VG</b>	<b>Flower head:disc type</b>				
(*)						
(+)						
<b>QL</b>	daisy					1
	anemone					2
<b>13.</b>	<b>VG</b>	<b>Flower head: collarette segments</b>				
(*)						
(+)						
<b>QL</b>	absent					1
	present					9
<b>14.</b>	<b>MS</b>	<b>Flower head: diameter</b>				
(*)						
<b>QN</b>	small					3
	medium					5
	large				Sensation Radiance	7

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota	
<b>15.</b>	<b>MS</b>	<b>Flower head: disc diameter relative to head diameter (including anemone type)</b>					
(*)							
(+)							
<b>QN</b>	small					3	
	medium					5	
	large					7	
<b>16.</b>	<b>VG</b>	<b>Flower head: fragrance</b>					
<b>QN</b>	absent or weak					1	
	medium					2	
	strong					3	
<b>17.</b>	<b>VG</b>	<b>Ray floret: Type</b>					
(*)							
(+)							
<b>QL</b>	ligulate					1	
	tubular				Seashells	2	
<b>18.</b>	<b>MS</b>	<b>Ray floret: length</b>					
(*)							
(+)							
<b>QN</b>	(c) short					3	
	medium					5	
	long				Sensation Radiance	7	
<b>19.</b>	<b>MS</b>	<b>Ray floret: width</b>					
(*)							
(+)							
<b>QN</b>	(c) narrow					3	
	medium					5	
	broad				Sensation Radiance	7	

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota	
<b>20.</b>	<b>MS</b>	<b>Ray floret: ratio length/ width</b>					
(*)							
(+)							
<b>QN</b>	(c)	moderately elongated					3
		medium					5
		moderately compressed					7
<b>21.</b>	<b>VG</b>	<b>Ray floret: depth of incision of apex</b>					
(*)							
(+)							
<b>QN</b>	(c)	shallow					3
		medium				Sensation Radiance, Sunset	5
		deep					7
<b>22.</b>	<b>VG</b>	<b>Ray floret: main color of inner side</b>					
(*)							
<b>PQ</b>	(c)	RHS Colour Chart					
	(d)	(indicate reference number)					
<b>23.</b>	<b>VG</b>	<b>Ray floret: secondary color of inner side</b>					
(*)							
<b>PQ</b>	(c)	RHS Colour Chart					
	(d)	(indicate reference number)					
<b>24.</b>	<b>VG</b>	<b>Ray floret: distribution of secondary color of inner side</b>					
(*)							
(+)							
<b>PQ</b>	(c)	base				Sensation Radiance	1
		marginal zone					2
		stripes					3

---

	English	français	deutsch	español	Example Varieties Exemples Beispielssorten Variedades ejemplo	Note/ Nota
<b>25.</b>	<b>VG</b>					
(*)						
					<b><u>Only non ligulate ray florets:</u></b> <b><u>tubular:Ray floret:</u></b> <b>main color of outer side</b>	
<b>PQ</b>	(c)	RHS Colour Chart				
	(d)	(indicate reference number)				
<b>26.</b>	<b>VG</b>					
(*)						
					<b>Disc: main color(including anemone type)</b>	
	(e)	RHS Colour Chart (indicate reference number)				

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8. Explanations on the Table of Characteristics

8.1 *Explanations covering several characteristics*

Characteristics containing the following key in the second column of the Table of Characteristics should be examined as indicated below:

- (a) Stem characteristics should be observed on the middle third of a primary stem.
- (b) Leaf characteristics should be observed on typical leaves taken from the upper third of the stem.
- (c) Ray floret should be observed on the outermost row of ray florets.
- (d) The main color is the color with the largest total surface area, the secondary color (if present) is the color with the second largest total surface area.
- (e) The color of disc should be observed at anther dehiscence in daisy type, at full flower in anemone type.

8.2 *Explanations for individual characteristics*

Ad. 5: Leaf type.



1  
lineared lobe



2  
broad lobe

Ad. 6: Leaf: number of lobe.

(For the lineared lobed leaf type)



1  
few



2  
medium



3  
many

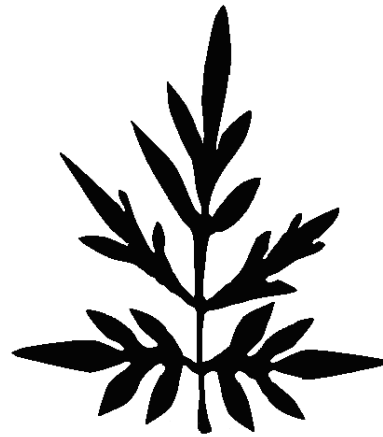
(For the broad lobed leaf type)



1  
few



2  
medium

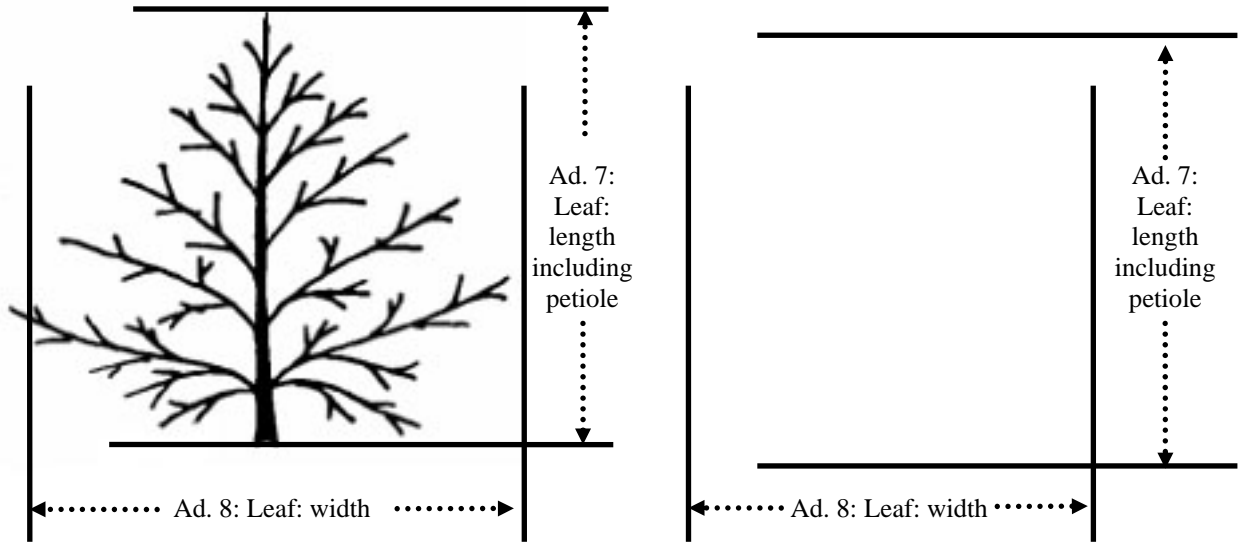


3  
many

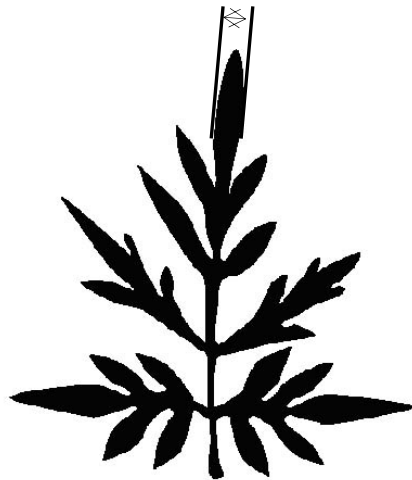


Ad. 7: Leaf: length including petiole.

Ad. 8: Leaf: width.



Ad.10: Leaf: length of terminal leaflet.



Ad. 11: Flower head: type.

1. single: flower heads with one whorl of ray florets
2. semi double: flower heads with two whorl to five row of ray florets
3. double: flower heads with more than six whorl of ray florets



1  
single

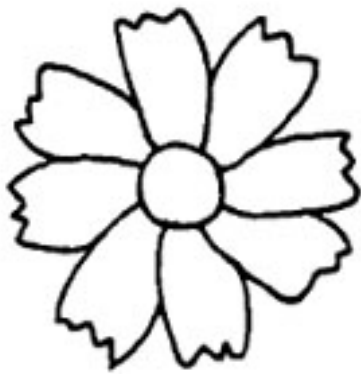


2  
semi double



3  
double

Ad. 12: Flower head: disc type.

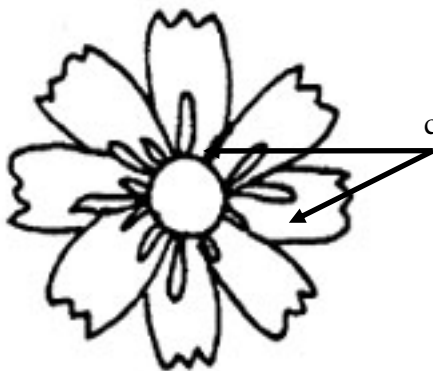


1  
daisy



2  
anemone

Ad. 13: Only varieties with flower head type: single: Flower head: collarette segments.



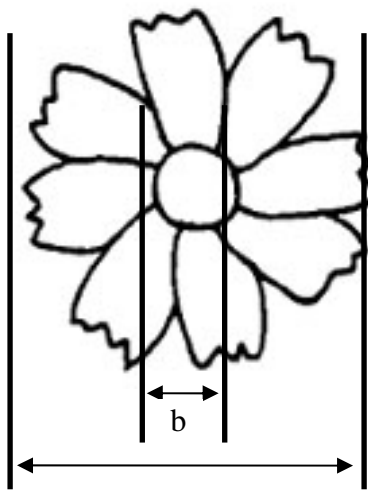
9  
present



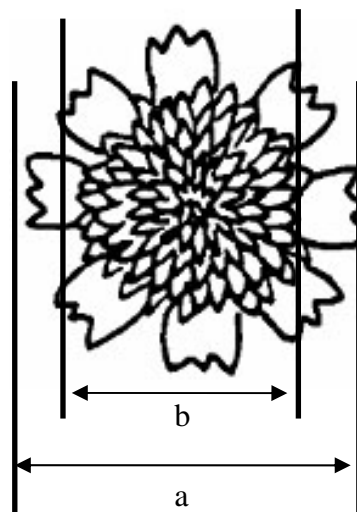
Ad.15: Flower head: disc diameter relative to head diameter(including anemone type).

a: head diameter

b: size of disc florets



3  
small



7  
large

Ad. 17: Ray floret: Type.

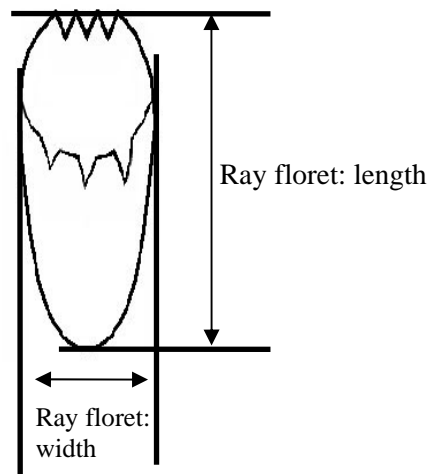
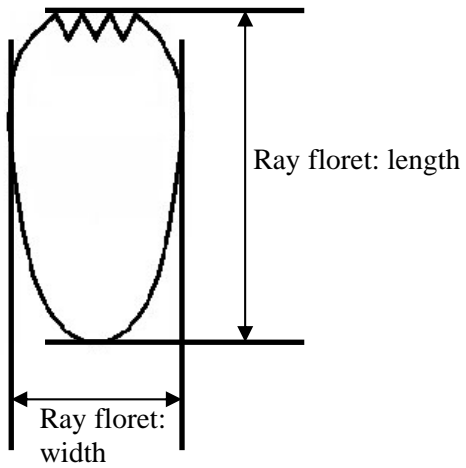


2 tubular

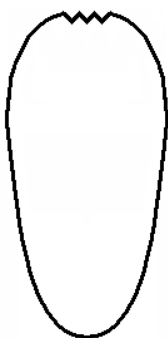
Ad. 18: Ray floret: length.

Ad. 19: Ray floret: width.

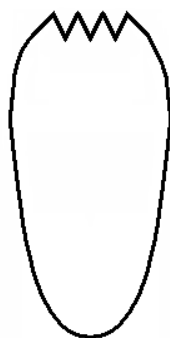
Ad. 20: Ray floret: ratio length/width.



Ad. 21: Ray floret: depth of incision of apex.



3  
shallow



5  
medium



7  
deep

Ad. 24: Ray floret: distribution of secondary color of upper side.



1  
base



2  
marginal zone



3  
stripes

9. Literature

Tsukamoto, Y., 1994: The Grand Dictionary of Horticulture Volume 1.  
The Shogakukan Ltd., Tokyo, JP, pp. 860 to 862

L. H. Bailey Hortorium, Cornell University, 1976: Hortus Third, A Concise Dictionary of  
Plants Cultivated in the U.S. and Canada. the staff of the L. H. Bailey Hortorium, Cornell  
University. Macmillan Publishing Co., New York, US, p. 321

10. Technical Questionnaire

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
		Application date: (not to be filled in by the applicant)
<b>TECHNICAL QUESTIONNAIRE</b> to be completed in connection with an application for plant breeders' rights		
1. Subject of the Technical Questionnaire		
1.1 Botanical name	<input type="text" value="Cosmos Cav."/>	
1.2 Common name	<input type="text" value="Cosmos"/>	
2. Applicant		
Name	<input type="text"/>	
Address	<input type="text"/>	
Telephone No.	<input type="text"/>	
Fax No.	<input type="text"/>	
E-mail address	<input type="text"/>	
Breeder (if different from applicant)	<input type="text"/>	
3. Proposed denomination and breeder's reference		
Proposed denomination (if available)	<input type="text"/>	
Breeder's reference	<input type="text"/>	

#4. Information on the breeding scheme and propagation of the variety

4.1 Breeding scheme

Variety resulting from:

4.1.1 Crossing

- (a) controlled cross [ ]  
 (please state parent varieties)

(.....)	x	(.....)
female parent		male parent

- (b) partially known cross [ ]  
 (please state known parent variety(ies))

(.....)	x	(.....)
female parent		male parent

- (c) unknown cross [ ]

- 4.1.2 Mutation [ ]  
 (please state parent variety)

--

- 4.1.3 Discovery and development [ ]  
 (please state where and when discovered and how developed)

--

- 4.1.4 Other [ ]  
 (please provide details)

--

# Authorities may allow certain of this information to be provided in a confidential section of the Technical Questionnaire.

## 4.2 Method of propagating the variety

### 4.2.1 Seed-propagated varieties

- (a) Self-pollination [ ]
- (b) Cross-pollination [ ]
- (i) population [ ]
- (ii) synthetic variety [ ]
- (c) Hybrid [ ]
- {...see GN 32 for example...}
- (d) Other [ ]
- (please provide details)

--

### 4.2.2 Vegetatively propagated varieties

- (a) cuttings [ ]
- (b) *in vitro* propagation [ ]
- (c) other (state method) [ ]

--

- 4.2.3 Other [ ]
- (please provide details)

--



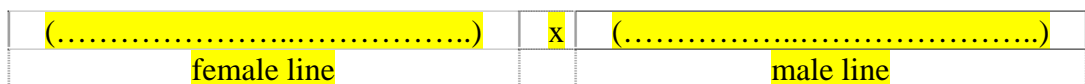
TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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In the case of hybrid varieties the production scheme for the hybrid should be provided on a separate sheet. This should provide details of all the parent lines required for propagating the hybrid e.g.

*Single Hybrid*



*Three-Way Hybrid*



and should identify in particular:

- (a) any male sterile lines
- (b) maintenance system of male sterile lines.

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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5. Characteristics of the variety to be indicated (the number in brackets refers to the corresponding characteristic in Test Guidelines; please mark the note which best corresponds).

Characteristics	Example Varieties	Note
<b>5.1 Leaf: type</b> (5)		
lineared lobe		1[ ]
broad lobe		2[ ]
<b>5.2 Flower head: type</b> (11)		
single		1[ ]
semi double		2[ ]
double		3[ ]
<b>5.3 Flower head: disc type</b> (12)		
daisy		1[ ]
anemone		2[ ]
<b>5.4 Flower head: collarette segments</b> (13)		
absent		1[ ]
present		9[ ]
<b>5.5 Ray floret: Type</b> (17)		
ligulate		1[ ]
tubular		2[ ]
<b>5.6(i) Ray floret: main color of inner side</b> (22)		
RHS Color Chart (indicate reference number)		

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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Characteristics	Example Varieties	Note
<b>5.6(ii) Ray floret: main color of inner side (22)</b>		
white		1[ ]
yellow		2[ ]
orange		3[ ]
pink		4[ ]
red		5[ ]
red purple		6[ ]
brown red		7[ ]
other color (indicate)		8[ ]

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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6. Similar varieties and differences from these varieties

*Please use the following table and box for comments to provide information on how your candidate variety differs from the variety (or varieties) which, to the best of your knowledge, is (or are) most similar. This information may help the examination authority to conduct its examination of distinctness in a more efficient way.*

Denomination(s) of variety(ies) similar to your candidate variety	Characteristic(s) in which your candidate variety differs from the similar variety(ies)	Describe the expression of the characteristic(s) for the <b>similar</b> variety(ies)	Describe the expression of the characteristic(s) for <b>your</b> candidate variety
<i>Example</i>	<i>Ray floret: main color of inner side</i>	<i>yellow</i>	<i>orange</i>

Comments:

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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#7. Additional information which may help in the examination of the variety

7.1 In addition to the information provided in sections 5 and 6, are there any additional characteristics which may help to distinguish the variety?

Yes [ ] No [ ]

(If yes, please provide details)

7.2 Are there any special conditions for growing the variety or conducting the examination?

Yes [ ] No [ ]

(If yes, please provide details)

7.3 Other information

A representative color image of the variety should accompany the Technical Questionnaire.

8. Authorization for release

(a) Does the variety require prior authorization for release under legislation concerning the protection of the environment, human and animal health?

Yes [ ] No [ ]

(b) Has such authorization been obtained?

Yes [ ] No [ ]

If the answer to (b) is yes, please attach a copy of the authorization.

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# Authorities may allow certain of this information to be provided in a confidential section of the Technical Questionnaire.

TECHNICAL QUESTIONNAIRE	Page {x} of {y}	Reference Number:
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9. Information on plant material to be examined or submitted for examination.

9.1 The expression of a characteristic or several characteristics of a variety may be affected by factors, such as pests and disease, chemical treatment (e.g. growth retardants or pesticides), effects of tissue culture, different rootstocks, scions taken from different growth phases of a tree, etc.

9.2 The plant material should not have undergone any treatment which would affect the expression of the characteristics of the variety, unless the competent authorities allow or request such treatment. If the plant material has undergone such treatment, full details of the treatment must be given. In this respect, please indicate below, to the best of your knowledge, if the plant material to be examined has been subjected to:

- |   |         |        |
|---|---------|--------|
| (a) Microorganisms (e.g. virus, bacteria, phytoplasma)    | Yes [ ] | No [ ] |
| (b) Chemical treatment (e.g. growth retardant, pesticide) | Yes [ ] | No [ ] |
| (c) Tissue culture  | Yes [ ] | No [ ] |
| (d) Other factors   | Yes [ ] | No [ ] |

Please provide details for where you have indicated "yes".

.....

9.3 Has the plant material to be examined been tested for the presence of virus or other pathogens?

Yes [ ]  
(please provide details as specified by the Authority)

No [ ]

10. I hereby declare that, to the best of my knowledge, the information provided in this form is correct:

Applicant's name

Signature

Date

[End of document]